SC/QC/AMG/2022-23/P6-P5/C1

Date: 02-11-2023

1. TEST REPORT ON CEMENT:

Sub: Testing of 53 Grade Cement Sample (IS 12269-1987).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

PHYSICAL TESTS ON CEMENT

Grade * : 53,
Type * : O.P.C

TABLE 1.1:

SL No	Name of Test	Test Results	Requirements as per IS 8112-1989
1	Initial setting time	**159 min**	Shall not be less than 30 min
2	Final setting time	**281 min**	Shall not be more than 600 min
3	Fineness (by dry sieving on IS 90 micron sieve)	**2.02 %**	Not to exceed 10.0%
4	Soundness test(by Le-Chatelier's method)	**1.86 mm**	Shall not be more than 10 mm
5	Compressive strength a) 3 days (average of three results)	**28.18 N/Sq mm**	Shall not be less than 27 N/Sqmm

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SILICON CONSULTING ENGINEERS

SC/QC/AMG/2022-23/P6-P5/PCC1 **Date: 02-11-2023**

1. TESTING OF COARSE AND FINE AGGREGATES:

Sub: Testing of Coarse and Fine aggregates to be used for bed concrete.

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

1. COARSE AGGRGATES TABLE - SIEVE ANALYSIS:

IS Sieve Size, mm	Percentage passing	Requirements as per IS 383-1970 (Reaffirmed on 2007) % Passing	
	40 mm Sample	Single size	Graded
40mm	**100.00**	85-100	90 – 100
20mm	**63.10**	0 -20	30- 70
10mm	**35.80**	0 -5	10- 35
4.75mm	**3.60**	------	0- 5

2. FINE AGGREGATES TABLE - SIEVE ANALYSIS

IS Sieve Size, mm	Percentage Passing	Specification as Per IS: 383-1970(Reaffirmed 2002) Percentage Passing			Remarks
		Zone-I	Zone-II	Zone -III	
04.75	**96.30**	90-100	90-100	90-100	The Sample Conforms to Grading **Zone-II**
02.36	**80.50**	60-95	75-100	85-100	
01.18	**66.80**	30-70	55-90	75-100	
600.mic	**52.10**	15-34	35-59	60-79	
300.mic	**19.40**	5-20	8-30	12-40	
150.mic	**8.60**	0-10	0-10	0-10	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SILICON CONSULTING ENGINEERS

SC/QC/AMG/2022-23/P6-P5/CE1 **Date: 04-11-2023**

1. TEST REPORT ON CEMENT:

Sub: Testing of 53 Grade Cement Sample (IS 12269-1987).
{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}
Ref.: Material testing/PMC/22-23,
Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.
Name of the Agency/Contractor*: Sri . K. Venkataraju.

PHYSICAL TESTS ON CEMENT

Grade * : 53,
Type * : O.P.C

TABLE 1.1:

SL No	Name of Test	Test Results	Requirements as per IS 8112-1989
1	Initial setting time	**176 min**	Shall not be less than 30 min
2	Final setting time	**258 min**	Shall not be more than 600 min
3	Fineness (by dry sieving on IS 90 micron sieve)	**1.93 %**	Not to exceed 10.0%
4	Soundness test(by Le-Chatelier's method)	**2.11 mm**	Shall not be more than 10 mm
5	Compressive strength a) 3 days (average of three results)	**28.01 N/Sq mm**	Shall not be less than 27 N/Sqmm

The result of the materials tested meets the standards and hence can be used for the work.

SILICON CONSULTING ENGINEERS

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E-mail siliconcivilengineers@gmail.com

SC/QC/AMG/2022-23/P6-P5/FA1 **Date: 04-11-2023**

1. TESTING OF FINE AGGREGATES :

Sub: Testing of Fine Aggregates.

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

TABLE - 1.1 : SIEVE ANALYSIS :

IS Sieve Size,mm	Percentage Passing	Specification as Per IS: 383-1970(Reaffirmed 2002) Percentage Passing			Remarks
		Zone-I	Zone-II	Zone -II	
04.75	**95.30**	90-100	90-100	90-100	The Sample Conforms to Grading **Zone-II**
02.36	**81.00**	60-95	75-100	85-100	
01.18	**83.60**	30-70	55-90	75-100	
600. mic	**39.10**	15.34	35-59	60-79	
300.mic	**17.40**	5-20	8-30	12-40	
150.mic	**19.70**	0-10	0-10	0-10	

TABLE 1.2 ;

Sl No	Test Conducted	Sample	Results	**Requirements** as Per IS. Specification IS :383-1970 (Reaffirmed 2002)
1	Bulking of Sand	001	**19.66 %**	-----
2	Silt Content	----	**0.58 %**	Not more than 8%
3	Specific Gravity	----	**2.61**	-------

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 5...

SC/QC/AMG/2022-23/P6-P5/CA1 **Date: 04-11-2023**

1. TESTING OF COARSE AGGREGATES (20 mm):

Sub: Testing of Construction Materials.

{Project* PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref. Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor* Sri. K. Venkataraju.

Table - 1.1 : SIEVE ANALYSIS :

IS Sieve Size, mm	Percentage passing	Requirements as per IS 383-1970 (Reaffirmed on 2002) % Passing	
	20 mm Sample	Single size	Graded
40 mm	100.00	100.00	100.00
20 mm	98.60	85-100	90 - 100
10 mm	41.90	0 - 20	25 - 55
4.75 mm	3.70	0 - 5	0 - 10

TABLE 1.2 :

SL No	Test conducted	Results	Requirements as per IS:383-1970 & Tests Conforms to IS 2386(Part I to IV) – 1963 (Reaffirmed on 2002)
1	Flakiness Index	19.76 %	Not to exceed 25 %
2	Crushing value	28.52 %	Not to exceed 45 % for concrete other than for wearing surfaces and 30% for concrete for wearing surfaces

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/S1 **Date: 04-11-2023**

1. TEST REPORT ON REINFORCEMENT STEEL:

Sub: Testing of Reinforcement Steel of diameter 10 and 12 mm **TMT Steel.**

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

TABLE – 1

SL No	Details	For 10 mm		For 12 mm	
		Test Results	Min Req. as per IS 1786-2008	**Test Results**	Min Req. as per IS 1786-2008
01	Observed diameter of bar	**10.0 mm**	10.0 mm	**12.0 mm**	12.0 mm
02	Observed Wt/m Length **Kg/m**	**0.621**	0.567	**0.896**	0.834
03	Proof stress/Yield stress, fy , **N/mm^2**	**552.0**	500.0	**546.0**	500.0
04	Bend/ Re bend Test	**Ok**	---	**Ok**	---
05	Percentage of Elongation, %	**19.40**	12.00	**20.90**	12.00
06	Ultimate Tensile Strength **N/mm^2**	**635.0**	545.0	**641.0**	545.0

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

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E-mail siliconcivilengineers@gmail.com

SC/QC/AMG/2022-23/P6-P5/CB1 **Date: 13-11-2023**

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE

CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	06-11-23	13-11-23	07	22500	355	15.78	**15.41**
	002	"	"	"	"	340	15.11	
	003	"	"	"	"	345	15.33	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CB1A

Date: 04-12-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore

Name of the Agency/Contractor*: Sri. K. Venkataraju

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	06-11-23	04-12-23	28	22500	455	20.22	**20.74**
	002	"	"	"	"	475	21.11	
	003	"	"	"	"	470	20.89	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CB2

Date: 14-11-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/ mm^2)	Avg. Value
1	001	07-11-23	14-11-23	07	22500	335	14.89	**14.30**
	002	"	"	"	"	310	13.78	
	003	"	"	"	"	320	14.22	

The result of the materials tested meets the standards and hence can be used for the work

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CB2A

Date: 05-12-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	07-11-23	05-12-23	28	22500	465	20.67	21.26
	002	"	"	"	"	485	21.56	
	003	"	"	"	"	485	21.56	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

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E-mail siliconcivilengineers@gmail.com

SC/QC/AMG/2022-23/P6-P5/CB3 **Date: 16-11-2023**

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	09-11-23	16-11-23	07	22500	325	14.44	14.96
	002	"	"	"	"	350	15.56	
	003	"	"	"	"	335	14.89	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

SC/QC/AMG/2022-23/P6-P5/CB3A

Date: 07-12-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	09-11-23	07-12-23	28	22500	480	21.33	21.19
	002	"	"	"	"	465	20.67	
	003	"	"	"	"	485	21.56	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CB4 **Date: 16-11-2023**

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	09-11-23	16-11-23	07	22500	345	15.33	14.81
	002	"	"	"	"	325	14.44	
	003	"	"	"	"	330	14.67	

The result of the materials tested meets the standards and hence can be used for the work

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CB4A

Date: 07-12-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	09-11-23	07-12-23	28	22500	480	21.33	21.41
	002	"	"	"	"	475	21.11	
	003	"	"	"	"	490	21.78	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

#51317, 4th CROSS BEL 2nd STAGE BHARATH NAGAR ,BANGALORE – 560 091. CELL : 9448353883
E-mail siliconcivilengineers@gmail.com

SC/QC/AMG/2022-23/P6-P5/CB5

Date: 17-11-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).
{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,
Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.
Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm
Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	10-11-23	17-11-23	07	22500	325	14.44	**15.04**
	002	"	"	"	"	340	15.11	
	003	"	"	"	"	350	15.56	

The result of the materials tested meets the standards and hence can be used for the work.
Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CB5A

Date: 08-12-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	10-11-23	08-12-23	28	22500	460	20.44	**20.81**
	002	"	"	"	"	475	21.11	
	003	"	"	"	"	470	20.89	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Arunodaya layout Main Road

SILICON CONSULTING ENGINEERS K.S.R

SC/QC/AMG/2022-23/P6-P5/C1 **Date: 11-10-2023**

1. TEST REPORT ON CEMENT:

Sub: Testing of 53 Grade Cement Sample (IS 12269-1987).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref. Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

PHYSICAL TESTS ON CEMENT

Grade * : 53,
Type * : O.P.C

TABLE 1.1:

SL No	Name of Test	Test Results	Requirements as per IS 8112-1989
1	Initial setting time	**151 min**	Shall not be less than 30 min
2	Final setting time	**284 min**	Shall not be more than 600 min
3	Fineness (by dry sieving on IS 90 micron sieve)	**2.07 %**	Not to exceed 10.0%
4	Soundness test(by Le-Chatelier's method)	**1.92 mm**	Shall not be more than 10 mm
5	Compressive strength b) 3 days (average of three results)	**28.33 N/Sq mm**	Shall not be less than 27 N/Sqmm

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

SC/QC/AMG/2022-23/P6-P5/RC1 **Date: 11-10-2023**

1. TESTING OF COARSE AND FINE AGGREGATES:

Sub: Testing of Coarse and Fine aggregates to be used for bed concrete.

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

1. COARSE AGGRGATES TABLE - SIEVE ANALYSIS:

IS Sieve Size, mm	Percentage passing	Requirements as per IS 383-1970 (Reaffirmed on 2007) % Passing	
	40 mm Sample	Single size	Graded
40mm	**100.00**	85-100	90 – 100
20mm	**63.10**	0 -20	30- 70
10mm	**34.50**	0 -5	10- 35
4.75mm	**4.60**	------	0- 5

2. FINE AGGREGATES TABLE - SIEVE ANALYSIS:

IS Sieve Size, mm	Percentage Passing	Specification as Per IS: 383-1970(Reaffirmed 2002) Percentage Passing			Remarks
		Zone-I	Zone-II	Zone -III	
04.75	**98.20**	90-100	90-100	90-100	The Sample Conforms to Grading **Zone-II**
02.36	**86.90**	60-95	75-100	85-100	
01.18	**60.10**	30-70	55-90	75-100	
600.mic	**55.40**	15-34	35-59	60-79	
300.mic	**27.80**	5-20	8-30	12-40	
150.mic	**6.60**	0-10	0-10	0-10	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CE2 **Date: 11-10-2023**

1. TEST REPORT ON CEMENT:

Sub: Testing of 53 Grade Cement Sample (IS 12269-1987).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref. Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

PHYSICAL TESTS ON CEMENT

Grade * : 53,
Type * : O.P.C

TABLE 1.1:

SL No	Name of Test	Test Results	Requirements as per IS 8112-1989
1	Initial setting time	**168 min**	Shall not be less than 30 min
2	Final setting time	**285 min**	Shall not be more than 600 min
3	Fineness (by dry sieving on IS 90 micron sieve)	**1.91 %**	Not to exceed 10.0%
4	Soundness test(by Le-Chatelier's method)	**1.96 mm**	Shall not be more than 10 mm
5	Compressive strength b) 3 days (average of three results)	**28.73 N/Sq mm**	Shall not be less than 27 N/Sqmm

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/FA2

Date: 11-10-2023

1. TESTING OF FINE AGGREGATES :

Sub: Testing of Fine Aggregates.

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

TABLE - 1.1 : SIEVE ANALYSIS :

IS Sieve Size,mm	Percentage Passing	Specification as Per IS: 383-1970(Reaffirmed 2002) Percentage Passing			Remarks
		Zone-I	Zone-II	Zone -II	
04.75	**98.10**	90-100	90-100	90-100	The Sample Conforms to Grading **Zone-II**
02.36	**80.70**	60-95	75-100	85-100	
01.18	**59.40**	30-70	55-90	75-100	
600. mic	**38.50**	15.34	35-59	60-79	
300.mic	**25.80**	5-20	8-30	12-40	
150.mic	**6.20**	0-10	0-10	0-10	

TABLE 1.2 ;

Sl No	Test Conducted	Sample	Results	**Requirements** as Per IS. Specification IS :383-1970 (Reaffirmed 2002)
1	Bulking of Sand	001	**19.12 %**	-----
2	Silt Content	----	**0.56 %**	Not more than 8%
3	Specific Gravity	----	**2.61**	-------

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CA2 **Date: 11-10-2023**

1. TESTING OF COARSE AGGREGATES (20 mm):

Sub: Testing of Construction Materials.

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

Table - 1.1 : SIEVE ANALYSIS :

IS Sieve Size, mm	Percentage passing	Requirements as per IS 383-1970 (Reaffirmed on 2002) % Passing	
	20 mm Sample	Single size	Graded
40 mm	100.00	100.00	100.00
20 mm	98.00	85-100	90 - 100
10 mm	49.30	0 - 20	25 - 55
4.75 mm	8.80	0 - 5	0 - 10

TABLE 1.2 :

SL No	Test conducted	Results	Requirements as per IS:383-1970 & Tests Conforms to IS 2386(Part I to IV) – 1963 (Reaffirmed on 2002)
1	Flakiness Index	23.70 %	Not to exceed 25 %
2	Crushing value	29.10 %	Not to exceed 45 % for concrete other than for wearing surfaces and 30% for concrete for wearing surfaces

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

#S1317, 4th CROSS BEL 2nd STAGE BHARATH NAGAR ,BANGALORE – 560 091. CELL : 9448353883
E-mail siliconcivilengineers@gmail.com

SC/QC/AMG/2022-23/P6-P5/S2 Date: 19-10-2023

1. TEST REPORT ON REINFORCEMENT STEEL:

Sub: Testing of Reinforcement Steel of diameter 8, 12, 16, 20 & 25 mm **TMT Steel.**

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

TABLE – 1

SL No	Details	For 8 mm	
		Test Results	Min Req. as per IS 1786-2008
01	Observed diameter of bar	**8.0 mm**	8.0 mm
02	Observed Wt/m Length **Kg/m**	**0.398**	0.363
03	Proof stress/Yield stress, fy , **N/mm^2**	**531.0**	500.0
04	Bend/ Re bend Test	**Ok**	---
05	Percentage of Elongation, %	**19.90**	16.00
06	Ultimate Tensile Strength **N/mm^2**	**637.0**	565.0

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore-92

TABLE – 2

SL No	Details	For 12 mm		For 16 mm	
		Test Results	Min Req. as per IS 1786-2008	**Test Results**	Min Req. as per IS 1786-2008
01	Observed diameter of bar	**12.0 mm**	12.0 mm	**16.0 mm**	16.0 mm
02	Observed Wt/m Length **Kg/m**	**0.895**	0.834	**1.583**	1.483
03	Proof stress/Yield stress, fy , **N/mm^2**	**544.0**	500.0	**529.0**	500.0
04	Bend/ Re bend Test	**Ok**	---	**Ok**	---
05	Percentage of Elongation, %	**20.40**	16.00	**19.70**	16.00
06	Ultimate Tensile Strength **N/mm^2**	**639.0**	565.0	**645.0**	565.0

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SILICON CONSULTING ENGINEERS

TABLE – 3

SL No	Details	For 20 mm		For 25 mm	
		Test Results	Min Req. as per IS 1786-2008	**Test Results**	Min Req. as per IS 1786-2008
01	Observed diameter of bar	**20.0 mm**	20.0 mm	**25.0 mm**	25.0 mm
02	Observed Wt/m Length **Kg/m**	**2.479**	2.366	**3.852**	3.697
03	Proof stress/Yield stress, fy , **N/mm^2**	**518.0**	500.0	**558.0**	500.0
04	Bend/ Re bend Test	**Ok**	---	**Ok**	---
05	Percentage of Elongation, %	**22.70**	16.00	**19.60**	16.00
06	Ultimate Tensile Strength **N/mm^2**	**631.0**	565.0	**646.0**	565.0

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
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BBMP, Bangalore - 92

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SC/QC/AMG/2022-23/P6-P5/CBL1

Date: 01-11-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	25-10-23	01-11-23	07	22500	350	15.56	**15.93**
	002	"	"	"	"	365	16.22	
	003	"	"	"	"	360	16.00	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore

SILICON CONSULTING ENGINEERS

SC/QC/AMG/2022-23/P6-P5/CBL1A

Date: 22-11-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref. Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	25-10-23	22-11-23	28	22500	475	21.11	20.52
	002	"	"	"	"	450	20.00	
	003	"	"	"	"	460	20.44	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CBL2

Date: 01-11-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore

Name of the Agency/Contractor*: Sri. K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE

CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	25-10-23	01-11-23	07	22500	370	16.44	16.07
	002	"	"	"	"	355	15.78	
	003	"	"	"	"	360	16.00	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SILICON CONSULTING ENGINEERS

SC/QC/AMG/2022-23/P6-P5/CBL2A

Date: 22-11-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref. Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	25-10-23	22-11-23	28	22500	475	21.11	**21.48**
	002	"	"	"	"	490	21.78	
	003	"	"	"	"	485	21.56	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

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SC/QC/AMG/2022-23/P6-P5/CBL3 **Date: 10-11-2023**

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE

CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	03-11-23	10-11-23	07	22500	315	14.00	14.52
	002	"	"	"	"	330	14.67	
	003	"	"	"	"	335	14.89	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CBL3A **Date: 01-12-2023**

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref. Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE

CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	03-11-23	01-12-23	28	22500	495	22.00	**21.93**
	002	"	"	"	"	500	22.22	
	003	"	"	"	"	485	21.56	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CBL4 Date: 13-11-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref. Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	06-11-23	13-11-23	07	22500	350	15.56	**16.07**
	002	"	"	"	"	360	16.00	
	003	"	"	"	"	375	16.67	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SILICON CONSULTING ENGINEERS

#S1317, 4th CROSS BEL 2nd STAGE BHARATH NAGAR ,BANGALORE – 560 091. CELL : 9448353883
E-mail siliconcivilengineers@gmail.com

SC/QC/AMG/2022-23/P6-P5/CBL4A

Date: 04-12-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE

CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	06-11-23	04-12-23	28	22500	480	21.33	**20.52**
	002	"	"	"	"	450	20.00	
	003	"	"	"	"	455	20.22	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 64

SC/QC/AMG/2022-23/P6-P5/CBL5

Date: 16-11-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 07days Compressive Strength).
{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants }

Ref. Material testing/PMC/22-23,
Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore
Name of the Agency/Contractor*: Sri K. Venkataraju

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	09-11-23	16-11-23	07	22500	320	14.22	14.81
	002	"	"	"	"	335	14.89	
	003	"	"	"	"	345	15.33	

The result of the materials tested meets the standards and hence can be used for the work.
Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 64

SC/QC/AMG/2022-23/P6-P5/CBL5A

Date: 07-12-2023

1. TEST REPORT ON CEMENT CONCRETE CUBES:

Sub: Testing of Concrete Cubes (for 28days Compressive Strength).
{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON CEMENT CONCRETE CUBE SPECIMENS

Dimensions of Specimen : 150 X 150 X 150mm

Grade of Concrete* : M_{20}

TABLE 1.1:

Sl No	Location/ Identification*	Date of Casting*	Date of Testing	Age in Days	C/S Area in mm^2	Maximum Load in K.N	Compressive Strength (N/mm^2)	Avg. Value
1	001	09-11-23	07-12-23	28	22500	475	21.11	21.19
	002	"	"	"	"	485	21.56	
	003	"	"	"	"	470	20.89	

The result of the materials tested meets the standards and hence can be used for the work.
Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

#51317, 4th CROSS BEL 2nd STAGE BHARATH NAGAR ,BANGALORE – 560 091. CELL : 9448353883
E-mail siliconcivilengineers@gmail.com

SC/QC/AMG/2022-23/P6-P5/CBL1 Date: 28-11-2023

1. TEST REPORT ON PRE –CAST SOLID BLOCKS:

Sub: Testing of Pre-Cast Solid Block- Compressive strength.

{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.. Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

RESULTS OF COMPRESSIVE STRENGTH ON PRE CAST(Solid Blocks)

BLOCK SPECIMENS

TABLE 1. 1:

Sl No.	Dimensions of Specimen mm	Details	Cross Sectional Area mm^2	Maximum Load in KN	Compressive Strength N/mm^2	Average Compressive Strength N/mm^2
1	400 X 200 X 200	**Solid**	80000	360	4.50	4.46
2	,,	,,	80000	340	4.25	
3	,,	,,	80000	370	4.63	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/CBL2

Date: 28-11-2023

1. TEST REPORT ON PRE –CAST SOLID BLOCKS:

Sub: Testing of Pre-Cast Solid Block- Compressive strength.

{Project*. PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants }

Ref.: Material testing/PMC/22-23.

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore

Name of the Agency/Contractor* Sri K. Venkataraju

RESULTS OF COMPRESSIVE STRENGTH ON PRE CAST(Solid Blocks)

BLOCK SPECIMENS

TABLE 1. 1:

Sl No.	Dimensions of Specimen mm	Details	Cross Sectional Area mm^2	Maximum Load in KN	Compressive Strength N/mm^2	Average Compressive Strength N/mm^2
1	400 X 100 X 200	**Solid**	40000	180	4.50	4.25
2	,,	,,	40000	160	4.00	
3	,,	,,	40000	170	4.25	

The result of the materials tested meets the standards and hence can be used for the work.

Singanayakanahalli Madiwala Samudaya bhavana

SILICON CONSULTING ENGINEERS

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SC/QC/AMG/2022-23/P6-P5/DS1

Date: 11-12-2023

TEST REPORT

Sub: Testing of Pre-cast Material-Precast Slab (230mm thick).
{Project*: PACKAGE No-06 Developments of roads and drains at Machohalli, Kadabagere, Gollarahatti (Kitthanahalli), Singanayakanahalli Grama Panchayathi limits and surrounding areas of Yelahanka assembly Constituency Under Amrutha Nagarothana Grants.}

Ref.: Material testing/PMC/22-23,

Report Required for: Assistant Executive Engineer,
Yelahanka Project Division,
BBMP, Bangalore.

Name of the Agency/Contractor*: Sri . K. Venkataraju.

1. PHYSICAL TESTS ON PRECAST SLAB:

Sl No	Dia of Core D (mm)	Height of Core H (mm)	Core Wt (Kg)	Density of Core (kg / m^3)	H / D	Correction factor (Based on H/D)	Failure Load (kN)	Core Strength (N/mm^2)	Correction Factor for the Dia. (Strength of the Core x 1.08)	Corrected Cylinder Compressive Strength (N/mm^2)	Equivalent Cube Compressive Strength (N/mm^2)
1	100.00	180.00	3.298	2332.86	1.80	0.960	130.00	16.55	17.88	17.16	21.45
2	100.00	180.00	3.245	2295.37	1.80	0.960	135.00	17.19	18.56	17.82	22.28
3	100.00	180.00	3.259	2305.27	1.80	0.960	125.00	15.92	17.19	16.50	20.63

The result of the materials tested meets the standards and hence can be used for the work.
Sample Collected Site : Singanayakanahalli Arunodaya layout Main Road

Asst. Executive Engineer
Project Division
Yelahanka Zone
BBMP, Bangalore - 92

SILICON CONSULTING ENGINEERS

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